

**IN THE DRAWINGS:**

Figure 3 has been amended as shown on the replacement sheet attached hereto.

## **REMARKS**

In the Office Action dated May 31, 2005, the drawings were objected to because the Examiner stated they did not include reference characters 51,  $\alpha$  and  $\Delta\beta$ , which are mentioned in the written description. Accordingly, Figure 3 has been amended to include each of those designations, consistent with the description associated with Figure 3 at pages 12 and 13 of the specification.

The Examiner also noted a number of typographical errors in the specification, all of which have been corrected.

Informalities also were noted in claims 9, 11, 26 and 28, all of which have been corrected, in addition to correcting other typographical errors noted in the claims. Claims 9 and 26 were rejected under §112, second paragraph, as being indefinite because the Examiner stated it is unclear whether the "difference" described in claims 9 and 26 is a whole number or an odd multiple of one-half of the element separation. Each of claims 9 and 26 has been clarified on that point.

Claims 1-3, 5, 6, 11-14, 18-20, 22, 23, 28-30, 35 and 36 were rejected under 35 U.S.C. §102(b) as being anticipated by Swerdloff et al. Claims 1, 3-6, 10, 13-15, 18, 20-23, 27, 30 and 35-37 were rejected under 35 U.S.C. §102(b) as being anticipated by Pflaum. Claims 1, 3, 5-8, 10, 13-15, 18, 20, 22-25, 27, 30-32 and 35-37 were rejected under 35 U.S.C. §102(e) as being anticipated by Nakashima et al. Claims 31 and 32 were rejected under 35 U.S.C. §103(a) as being unpatentable over Swerdloff et al. further in view of Wagner. Claims 33 and 34 were rejected under 35 U.S.C. §103(a) as being unpatentable over Swerdloff et al., further in view of Horiuchi. Claims 31 and 32 also were rejected under 35 U.S.C. §103(a) as being unpatentable over Pflaum, further in view of Wagner. Claims 33 and 34 were

rejected under 35 U.S.C. §103(a) as being unpatentable over Swerdloff et al., further in view of Horiuchi. Claims 33 and 34 also were rejected under 35 U.S.C. §103(a) as being unpatentable over Pflaum, further in view of Horiuchi.

Claims 16, 17, 38 and 39 were stated to be allowable if rewritten in independent form.

Among other things, by the present Amendment claims 16 and 38 have been rewritten in independent form, and those claims, as well as claims 17 and 39 respectively depending therefrom, are submitted to be in condition for allowance.

With regard to the aforementioned rejections, only the Pflaum reference was relied upon as a basis for rejecting claims 4 and 21. None of the other rejections applied to either of claims 4 or 21.

By the present Amendment, the subject matter of claim 4, and a portion of the subject matter of claim 2, have been embodied in independent claim 1, and the subject matter of claim 21, and a portion of the subject matter of claim 19, have been embodied in independent claim 18. Amended claims 1 and 18 are submitted to be patentable over the Pflaum reference for the following reasons.

The Pflaum reference discloses an x-ray diagnostic apparatus having a rotating system for obtaining computed tomography data having an x-ray tube disposed opposite an arcuate radiation detector. This system rotates around a gantry 10. Also mounted on the gantry 10 is a further x-ray tube that is disposed opposite a matrix x-ray detector 13. This x-ray detector 13 is a laminar image detector, and is not arcuate but is, and must be, flat, as can be seen from Figures 1 and 2 of the Pflaum reference and as described at column 2, lines 59-67 and column 3, lines 11-15.

The planar image detector 13 in the Pflaum reference is not used to acquire computer tomography data, but instead is used to detect an x-ray shadow image (two-dimensional radiograph) so as to generate a simultaneously-produced overview exposure during the operation of the computed tomography data acquisition system, with which slice exposures are generated. This is described for example, at column 1, lines 57-65 and column 2, lines 1-8 of the Pflaum reference.

Therefore, the second radiation detector 13 in the Pflaum reference is not arcuate, as now required in amended claims 1 and 18, nor could or should that radiation detector be arcuate, because making that detector arcuate would distort any conventional radiograph that is produced with that radiation detector, thereby making it inoperable for its intended purpose in the Pflaum reference. Moreover, the second data acquisition system in the Pflaum reference does not generate computed tomography data, as also now required in independent claims 1 and 18, but instead simply generates a two-dimensional, conventional radiograph.

The Pflaum reference, therefore does not disclose all of the elements of amended claims 1 and 18, as arranged and operating in those claims, and therefore does not anticipate either of those claims. The respective sets of dependent claims depending from independent claims 1 and 18 add further structure to the novel combination of those independent claims, and therefore none of the dependent claims is anticipated by the Pflaum reference, for the same reasons discussed above in connection with independent claims 1 and 18.

All claims of the application are therefore submitted to be in condition for allowance, and early reconsideration of the application is respectfully requested.

Submitted by,

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